

Cybernetics and Systems

An International Journal

VOLUME 26

NUMBER 1

1995

CONTENTS

- 1** ARITHMETIC IN THE FORM
 Louis H. Kauffman
- 59** ON THE AUTOMATIC GENERATION OF EFFICIENT
 COMPUTATIONAL MODELS
 Tarek M. Nabhan and Albert Y. Zomaya
- 79** CONTINUOUS EVOLUTIONARY PROGRAMMING: ANALYSIS
 AND EXPERIMENTS
 Gary B. Fogel and David B. Fogel
- 91** MAXIMUM ISSUE QUANTITY PROBLEM FOR INVENTORY
 SYSTEMS WHEN DEMAND IS LUMPY
 K. L. Mak and K. K. Lai
- 111** FURTHER RESULTS ON POSSIBILITY-PROBABILITY
 CONVERSION VIA RELATIVE INFORMATION AND
 INFORMATIONAL INVARIANCE
 Guy Jumarie

Cybernetics and Systems

An International Journal

VOLUME 26

NUMBER 2

1995

CONTENTS

- 129** MORE ON THE MATHEMATICS OF RULE-BOUND SYSTEMS
Paul Ballonoff
- 133** BEYOND PRIVATE OWNERSHIP IN CENTRAL AND EASTERN EUROPE
Matjaz Mulej
- 149** DETERMINATION OF THE OPTIMAL MAXIMUM ISSUE QUANTITY FOR LUMPY DEMAND ITEMS WHEN CONTROLLED BY AN (s,S) POLICY
K. L. Mak and K. K. Lai
- 165** ON THE COLLISION DETECTION PROBLEM FOR ROBOT MANIPULATORS
Mark A. C. Gill and Albert Y. Zomaya
- 189** EMG FEATURE SELECTION FOR MOVEMENT CONTROL OF A CYBERNETIC ARM
Mahyar Zardoshti-Kermani, Bruce C. Wheeler, Kambiz Badie, and Reza M. Hashemi
- 211** A NETWORK MODEL FOR ORGANIZATIONAL DECISION MAKING
Heng-Li Yang
- 237** NEW METHODOLOGY TO FUZZY REASONING FOR RULE-BASED EXPERT SYSTEMS
Shyi-Ming Chen
- 265** ANNOUNCEMENTS

Cybernetics and Systems

An International Journal

VOLUME 26

NUMBER 3

1995

CONTENTS

- 267 CREATIVITY AND COMPUTERS**
Margaret A. Boden
- 295 STABILIZING CONTROLLER DESIGN FOR LINEAR UNKNOWN UNSTABLE SYSTEMS: SUCCESSIVE LEARNING IDENTIFICATION AND MAXIMALLY ROBUST CONTROLLER DESIGN**
K. L. Teo, Z. Zang, and W. Yan
- 315 FUZZY TAXONOMIC SYSTEM OF TAIWAN *GANODERMA***
Chen Wang, Hsiao-Fan Wang, and Guang-Yaw Wu
- 343 ALGORITHM FOR DATA SAMPLE REPRESENTATION BY HISTOGRAMS WITH UNEQUAL CELL WIDTHS**
Elvira Di Nardo and Enrica Pirozzi
- 349 ADAPTATION CHANNELS**
G. J. Marshall and A. Behrooz
- 367 NEW METHOD TO ESTIMATE PARAMETERS IN A NONLINEAR SYSTEM OF PURINE NUCLEOTIDE METABOLISM**
Germano Resconi, R. Pagani, and M. Pizzichini

Cybernetics and Systems

An International Journal

VOLUME 26

NUMBER 4

1995

CONTENTS

- 379** HOW SMART DOES YOUR BED HAVE TO BE, BEFORE YOU ARE AFRAID TO GO TO SLEEP AT NIGHT?
Rich Gold
- 387** HYBRID NEWTON-RAPHSON GENETIC ALGORITHM FOR THE TRAVELING SALESMAN PROBLEM
W. Lin, J. G. Delgado-Frias, D. C. Gause, and S. Vassiliadis
- 413** PRIMAL DECOMPOSITION METHOD FOR MULTIOBJECTIVE STRUCTURED NONLINEAR PROGRAMS WITH FUZZY GOALS
Masatoshi Sakawa, Hitoshi Yano, and Kazuya Sawada
- 427** AN APPROACH TO THE LINGUISTIC SYNTHESIS OF FUZZY CONTROLLERS
Gang Ju and Laijiu Chen
- 443** TOWARD A CONSTRUCTIVE NOTION OF FUNCTIONALITY
Antônio Carlos da Rocha Costa, José Mauro Volkmer de Castilho, and Dalcidio Moraes Claudio
- 481** USING *K*-SYSTEMS THEORY TO COMPUTE TRUE MAIN AND INTERACTION EFFECTS IN A DESIGN OF EXPERIMENTS
Deky Gouw and Bush Jones

Cybernetics and Systems

An International Journal

VOLUME 26

NUMBER 5

1995

CONTENTS

- 499** AUTONOMOUS EXPLORATION AND CONTROL OF CHAOTIC SYSTEMS

Elizabeth Bradley

- 521** TREE STRUCTURES OF LINEAR THRESHOLD UNITS FOR THE CLASSIFICATION OF NUMERIC EXAMPLES

Miroslav Kubat and Doris Flotzinger

- 535** LINGUISTIC GEOMETRY: METHODOLOGY AND TECHNIQUES

Boris Stilman

- 599** ANNOUNCEMENT

Cybernetics and Systems

An International Journal

VOLUME 26

NUMBER 6

1995

CONTENTS

- iii OBITUARY: FRANK LESTER SHERMAN
Robert Trappl
- 601 FEELING DECISION SYSTEMS AND QUANTUM MECHANICS
Teruaki Nakagomi
- 621 BOOK RECOGNITION AS AN EXAMPLE OF FLAT AND
STRUCTURED OBJECTS CLASSIFICATION
A. Leonardi, S. Messelodi, and L. Stringa
- 647 EXISTENCE OF MAJOR DISEASES AND MODELING OF
EPIDEMIOLOGIC TRANSITION: A GENERAL SYSTEMS
THEORETIC APPROACH
Yi Lin and Kimberly Y.-Z. Forrest
- 665 GIBBS DERIVATIVES IN LINEAR SYSTEM THEORY
Yasushi Endow and Radomir S. Stanković
- 681 THE INTELLIGENT TUTORING SYSTEM AS A TRAINING
INTERVENTION: IMPLEMENTING ITSs IN INDUSTRY
D. S. Johnson and K. F. Pieper
- 697 ON ANALOGY FOR SOFTWARE REUSE: A PERSPECTIVE
FROM CYBERNETICS
Zhengxin Chen
- 713 APPROXIMATE REASONING AND INTERPRETATION OF
LABORATORY TESTS IN MEDICAL DIAGNOSTICS
G. P. Amaya Cruz and G. Beliakov
- 731 EIGENVECTOR METHOD IN MULTICRITERIA OUTRANKING
RELATIONS
Eiji Takeda and Yoshio Tabata

